BEFORE THE DEPARTMENT OF ENVIRONMENTAL QUALITY OF THE STATE OF MONTANA

In the matter of the amendment of ARM) NOTICE OF PUBLIC HEARING
17.36.103, 17.36.106, 17.36.112,) ON PROPOSED AMENDMENT
17.36.116, 17.36.310, 17.36.314,)
17.36.326, 17.36.330, 17.36.331,) (SUBDIVISIONS)
17.36.333, 17.36.334, 17.36.335,	
17.36.345, 17.36.802, and 17.36.804)
pertaining to the adoption of a new version)
of Department Circular DEQ-8	

TO: All Concerned Persons

- 1. On October 13, 2017 at 10:00 a.m., in Room 111 of the Metcalf Building, 1520 East Sixth Avenue, Helena, Montana, the department will hold a public hearing to consider the proposed amendment of the above-stated rules.
- 2. The department will make reasonable accommodations for persons with disabilities who need an alternative accessible format of this notice. If you require an accommodation, contact Sandy Scherer, Legal Secretary, no later than 5:00 p.m., October 6, 2017, to advise of the nature of the accommodation that you need. Please contact Sandy Scherer, Department of Environmental Quality, P.O. Box 200901, Helena, Montana 59620-0901; phone (406) 444-2630; fax (406) 444-4386; or e-mail sscherer@mt.gov.
- 3. The rules proposed to be amended provide as follows, stricken matter interlined, new matter underlined:
 - <u>17.36.103 APPLICATION--CONTENTS</u> (1) through (1)(r) remain the same.
- (s) except for connections to existing public systems addressed under ARM 17.36.328(2)(b)(iv), if the proposed water supply is from wells, or springs, or a surface water source, a letter from the Department of Natural Resources and Conservation stating that the water supply, either:
 - (i) through (v) remain the same.

AUTH: 76-4-104, MCA

IMP: 76-4-104, [Sections 1 and 2, Chapter 344, Laws of 2017], 76-4-125,

MCA

REASON: Under 76-4-104(6)(b), MCA, the department must require adequate evidence that a water supply that is sufficient in terms of quality, quantity, and dependability will be available before a subdivision can be approved. In the past, subdivisions have been developed and lots have been sold in areas where an exemption or a water right cannot be granted. The amendment is reasonably necessary to allow the department to better assess the dependability of a proposed surface water supply and to help prevent the development of a subdivision using

surface water when water is not legally available for use.

- <u>17.36.106 REVIEW PROCEDURES--APPLICABLE RULES</u> (1) The procedures <u>and timelines</u> for review of subdivision applications by the reviewing authority are as <u>provided in [Section 1, Chapter 344, Laws of 2017].</u> follows:
- (a) Upon receipt of a subdivision application, the department will have 55 days to approve, conditionally approve, or deny the subdivision application, unless an environmental impact statement is required, in which case action must be taken within 120 days.
- (b) If a local department or board of health has been certified as the reviewing authority pursuant to 76-4-104, MCA, the local reviewing authority shall, within 45 days after receipt of a subdivision application, review the application and forward the application to the department together with a recommended action for approval, conditional approval, or denial. The department shall take final action on the application within ten days after receiving the recommendation of the local reviewing authority, but not later than the time remaining in the 55-day or 120-day period set out in (1)(a).
- (i) If the local reviewing authority recommends denial of an application, the recommendation must be in the form of a denial letter sent to the applicant within 45 days after receipt of the application. The local reviewing authority shall send a copy of the application and denial letter to the department. A denial letter issued by the local reviewing authority shall constitute the department's final action regarding the denial unless the department finds, pursuant to ARM 17.36.116, that the recommended denial was in error.
- (c) If an application is incomplete, the reviewing authority shall deny the application, setting forth, in writing, the deficiencies to the applicant and the applicant's representative. If the additional information is submitted within 30 days after the date of the denial letter, the reviewing authority shall review the resubmitted application within 30 days after receipt. If the review is conducted by a local department or board of health that is certified under 76-4-104, MCA, the department shall make a final decision on the resubmitted application within ten days after the local reviewing authority completes its review. If the additional information is not submitted within 30 days after the date of the denial letter, the review time frames in (a) and (b) apply.
- (2) Pursuant to 76-4-125(1)(b), MCA, for an application that is not subject to review by a local reviewing authority under 76-4-104, MCA, the department shall provide an informational written notice to the applicant, within five working days after receipt of an application, if any of the following items is not submitted with the application:
 - (a) the certification required by ARM 17.36.108(1)(a);
- (b) if applicable, an approval from the local governing body under Title 76, chapter 3, MCA; or
- (c) if applicable, public comments or summaries of public comments collected as provided in 76-3-604(7)(a), MCA.
 - (3) and (4) remain the same but are renumbered (2) and (3).

AUTH: 76-4-104, MCA

IMP: 76-4-104, MCA, [Section 1, Chapter 344, Laws of 2017], 76-4-125, MCA

REASON: The subdivision review process described in the existing rule is now outdated in light of the 2017 Legislature's revisions to the Sanitation in Subdivisions Act. See Chapter 344, Laws of 2017. The proposed changes delete the old requirements and specify that the review process will be as provided in Chapter 344, Laws of 2017. Because that statute describes the process and timelines for review, it is unnecessary to repeat the requirements in the administrative rules.

<u>17.36.112 RE-REVIEW OF PREVIOUSLY APPROVED FACILITIES:</u> <u>PROCEDURES</u> (1) through (5) remain the same.

- (6) Facilities previously approved under Title 76, chapter 4, MCA, are not subject to re-review, if they are not proposed to be changed, and are not affected by a proposed change to another facility, are operating properly, and meet the conditions of their approval. To determine whether previously approved water and sewer facilities are operating properly, the reviewing authority may require submittal of well logs, water sampling results, any septic permit issued, and evidence that the septic tank has been pumped in the previous three years.
 - (7) and (8) remain the same.

AUTH: 76-4-104, MCA IMP: 76-4-125, MCA

REASON: ARM 17.36.112 applies to rewrites of certificates of subdivision approval when no new subdivision is proposed. Under the existing rule, previously approved facilities are not subject to re-review if they are not being changed and will not be affected by a change to another facility, meaning that previously approved facilities that could now pose a risk to human health or the environment are not subject to re-review. The proposed changes require that, to avoid re-review, the systems also must operate properly and meet the conditions of their approval. Previously approved facilities that are not operating properly could pose a risk to human health or the environment, such as malfunctioning drainfields or sewage lagoons. Likewise, facilities that do not meet their conditions of approval—such as wells or drainfields that were not constructed in their approved locations—could pose a risk to human health or the environment. The proposed changes also resolve any ambiguity in the existing rule, which provides a method of determining whether previously approved facilities are operating properly but does not state that improperly operating facilities are subject to re-review.

17.36.116 CERTIFICATION OF LOCAL DEPARTMENT OR BOARD OF HEALTH (1) through (2)(a)(v) remain the same.

- (vi) other applicable laws and regulations; and
- (b) have a minimum of one year's experience performing subdivision review under the direct supervision of the department or of a department-approved registered sanitarian or professional engineer-; and

- (c) for individuals previously qualified under this subsection, complete at least one subdivision review in the preceding two years. Previously qualified individuals who have not completed at least one subdivision review in the preceding two years shall, prior to performing subdivision review, satisfy the requirements in subsection (2)(a).
 - (3) and (4) remain the same.

AUTH: 76-4-104, MCA

IMP: 76-4-104, 76-4-105, MCA

REASON: ARM 17.36.116(2) provides the requirements for individuals to conduct subdivision reviews for a local department or board of health, but the rule does not provide a way to ensure that such an individual remains competent. The proposed rule requires a previously qualified individual to retake the department's written exam if the individual has not completed a review in the preceding two years. This change is proposed because an individual who has not completed a subdivision review for two or more years may not be aware of changes to statutes, administrative rules, or department circulars. A reviewer's familiarity with these requirements is especially important because of the department's limited oversight of a local authority's review of subdivision applications.

- <u>17.36.310 STORM DRAINAGE</u> (1) The applicant shall submit a storm drainage plan in accordance with department Circular DEQ-8 to the reviewing authority. The plan must include a design report, calculations, and plan sheets sufficient to provide construction details of the storm drainage system and must conform with the requirements of either (2) or (3).
- (2) Except as provided in (3), a storm drainage plan must be designed in accordance with Department Circular DEQ-8.
- (a) for lots proposed for uses other than as single living units, a storm drainage plan submitted under (2) must be prepared by a professional engineer and the storm drainage system is subject to the requirements in ARM 17.36.314;
- (b) a storm drainage plan submitted under (2) must include a maintenance plan for all drainage structures. The maintenance plan must describe the maintenance structures, provide a maintenance schedule, and designate the entity responsible for performing maintenance. The reviewing authority may require the applicant to create a homeowner's association or other legal entity that will be responsible for maintenance of storm drainage structures and that will have authority to charge appropriate fees. The maintenance plan must include easements and agreements as necessary for operation and maintenance of all proposed off-site storm drainage structures or facilities.
- (2) Storm drainage plans must be prepared by a professional engineer and must comply with the requirements in ARM 17.36.314 if the subdivision application proposes either of the following:
 - (a) six or more lots; or
- (b) a commercial lot or a lot proposed for use other than a single living unit, with greater than 25% impervious area.
 - (3) Regardless of the type of use or the number of commercial or residential

units proposed, a storm drainage plan is not subject to the requirements of (2) if all of the requirements in (3)(a) through (h) are met. To be exempt from the requirements of (2), a storm drainage plan must be submitted demonstrating that:

- (a) the proposed subdivision has five or fewer lots;
- (b) the area of disturbance within each proposed lot has a slope of three percent or less;
- (c) unvegetated areas including, but not limited to, road surfaces, road cuts and fills, roofs, and driveways, comprise less than 15 percent of the total acreage of each proposed lot;
- (d) drainage structures, such as road ditches, exist or, if necessary, will be constructed:
- (e) completion of the proposed subdivision will not increase the amount of pre-development storm water runoff, during the 100-year 24-hour storm event, between proposed lots and from the proposed subdivision area to an adjoining property;
- (f) the proposed subdivision will not alter pre-development pass-through water flow patterns;
- (g) the applicant provides the reviewing authority with a 7 1/2 minute USGS topographic map showing the proposed subdivision and, if available, a map with contour intervals no greater than 20 feet that shows drainage patterns; and
- (h) no buildings or drainfields in the subdivision will be flooded during the 100-year 24-hour storm event.
- (3) A storm drainage plan submitted under (2) must include a maintenance plan for all drainage structures. The maintenance plan must describe the drainage structures, provide a maintenance schedule, and designate the entity responsible for performing maintenance. The reviewing authority may require the applicant to create a homeowner's association or other legal entity that will be responsible for maintenance of storm drainage structures and that will have authority to charge appropriate fees. The maintenance plan must include easements and agreements as necessary for operation and maintenance of all proposed storm drainage structures or facilities.
- (4) The applicant shall obtain an easement if the reviewing authority determines the easement is needed to allow adequate operation and maintenance of the facilities. The easement must be filed with the county clerk and recorder at the time the certificate of subdivision approval issued under this chapter is filed. The easement must be in one of the following forms:
 - (a) in writing signed by the grantor of the easement; or
- (b) if the same person owns both parcels, shown on the plat or certificate of survey for the proposed subdivision.
- (5) The reviewing authority may waive the requirements of (1), (2), and (3) for subdivisions located entirely within a first-class or second-class municipality, as described in 7-1-4111, MCA, or within a Municipal Separate Storm Sewer System (MS4) general permit area, as defined in ARM 17.30.1102, if:
- (a) the applicant submits to the reviewing authority a letter of consent from the municipal or MS4 entity on a form provided by the department; and

- (b) the municipal or MS4 entity requires the applicant to comply with storm water drainage design standards. The design standards applicable to the applicant may not be less stringent than the requirements of Circular DEQ-8.
- (4)(6) If fill material will be placed displaced or added within a delineated floodplain, the applicant shall provide evidence that the floodplain permit coordinator has been notified and that appropriate approvals have been obtained.
 - (5) through (7) remain the same but are renumbered (7) through (9).

AUTH: 76-4-104, MCA

IMP: 76-4-104, 76-4-125, MCA

REASON: The existing rule contains requirements for the design of storm drainage plans, as well as a requirement that such plans must be designed in accordance with Department Circular DEQ-8. The proposed rule removes these requirements in favor of only the reference to DEQ-8. The proposed rule is proposed because design standards are more appropriately addressed through the more specific and detailed requirements of DEQ-8, and consolidating the requirements eases the administrative burden on both applicants and the reviewing authority.

The existing rule requires that a professional engineer prepare plans for lots proposed for uses other than as single living units. The proposed changes modify this rule to require that a professional engineer prepare storm drainage plans for major subdivisions, and commercial sites with 25 percent or more impervious area. Requiring that a professional engineer prepare plans for these types of sites is reasonably necessary because these sites require complex storm drainage plans due to roads, parking, and other impervious surfaces. Further, the proposed changes require that a professional engineer submit certified as-builts under ARM 17.36.314, which is reasonably necessary to ensure that the storm drainage facilities for these more complicated sites are constructed according to the approved plans.

The proposed changes would move existing (2)(b) to new (3). "Maintenance structures" would be changed to "drainage structures" for clarity. The proposed changes also remove the word "off-site" for the types of storm drainage structures or facilities that must have easements and agreements. This change is reasonably necessary to clarify when easements and agreements must be included in a storm drainage maintenance plan. A single project may involve several contiguous lots, with storm drainage facilities crossing lot lines. Easements in such a situation are necessary to protect the integrity of the facilities should any of the lots be sold in the future. New (4) requires that easements be in writing and signed by the grantor or, if the same person owns both parcels, requires that the easement be shown on the plat or certificate of survey for the subdivision. This amendment is necessary to ensure that the easement is of record and therefore effective.

The changes also propose an exemption to the requirement for storm drainage design reports for those applications also subject to local (Municipal/MS4) storm water review, so long as the local review complies with DEQ-8. This change is proposed because review by the department in such cases would be duplicative and would not provide any additional value to the applicant or the department and would not provide any additional protection to human health or the environment.

Finally, the proposed changes require that an applicant receive approval from the local floodplain permit coordinator if the applicant plans on displacing or adding material within a floodplain, instead of only adding material. Because many counties have adopted rules that require permits for the addition and removal of material within designated flood plains, this change is necessary to ensure that all the appropriate approvals have been obtained from the floodplain coordinator.

<u>17.36.314 REQUIREMENTS FOR SYSTEMS DESIGNED BY PROFESSIONAL ENGINEERS</u> (1) through (4) remain the same.

(5) If construction of the system is not completed within three years after the department has issued its written approval of the plans and specifications, the approval is void and plans and specifications must be resubmitted to the department, with appropriate fees, for review and approval. If the original conditions of approval, applicable rules, and design standards have not changed since the department approved the system, the department shall reissue the approval to allow an additional three years to complete construction.

AUTH: 76-4-104, MCA IMP: 76-4-125, MCA

REASON: Certain systems may take more than three years to be constructed, for any number of reasons. Under the existing rule, an applicant whose approval has expired must seek re-approval of the system, even when there have been no changes to the original conditions of approval or applicable rules and standards. When there have not been any changes, such re-review is duplicative and provides no value to the applicant, the department, public health, or the environment. Thus, the proposed changes, which allow the department to reissue the original approval for three more years, are reasonably necessary to avoid the unnecessary expenditure of costs and resources by both the department and the applicant. The proposed changes also make some stylistic changes that are necessary to clarify the rule.

<u>17.36.326 SEWAGE SYSTEMS: OPERATION AND MAINTENANCE, OWNERSHIP, EASEMENTS, AND AGREEMENTS</u> (1) through (4) remain the same.

(5) If an application includes a Users of multiple user and shared or multipleuser sewage systems that serves more than one lot, the applicant shall submit to the reviewing authority a draft user agreement must have an agreement that identifies the rights and responsibilities of each user. When a lot is sold, the new owner shall sign the user agreement. User agreements must be in a form acceptable to the department.

AUTH: 76-4-104, MCA IMP: 76-4-104, MCA

<u>REASON:</u> The proposed changes remove the mandatory requirement that all users of a shared or multiple-user sewage treatment system must have a user

agreement. Some shared or multiple-user systems do not need user agreements because they are located on a single lot. The change is also reasonably necessary to clarify that the person responsible for submitting the user agreement to the department is the applicant, not the users of the system, since the lots may not have been sold at the time of the application.

The proposed changes also omit the requirement that the user agreement be signed by all users each time the lot is sold. The department does not regulate or monitor sales of properties, so the department has no way of enforcing this requirement. However, the certificate of subdivision approval will continue to apply to properties if they are sold, so any conditions of approval based on a user agreement will continue to apply to new property owners.

<u>17.36.330 WATER SUPPLY SYSTEMS—GENERAL</u> (1) through (4) remain the same.

(5) Each existing and proposed drinking water well in a proposed subdivision must be centered within a 100-foot radius well isolation zone. Except as provided in Pursuant to 76-4-104(6)(i), MCA, each proposed well isolation zone must be located wholly within the boundaries of the proposed subdivision where the well is located unless an easement or, for public land, other authorization is obtained from the landowner to place the proposed well isolation outside the boundaries of the proposed subdivision. This section does not apply to the divisions provided for in 76-3-207, MCA, except those under 76-3-207(1)(b), MCA.

AUTH: 76-4-104, MCA IMP: 76-4-104, MCA

REASON: The 2017 Legislature amended 76-4-104(6)(i), MCA, to allow a well isolation zone for an individual water system well that is a minimum of 50 feet inside the subdivision boundary to extend outside the boundaries of the proposed subdivision onto adjoining land that is dedicated for use as a right-of-way for roads, railroads, or utilities. See Section 2, Chapter 261, Laws of 2017. In light of that change, the proposed amendment is reasonably necessary to remove a conflict between the administrative rules and the amended statute.

<u>17.36.331 WATER SUPPLY SYSTEMS: WATER QUALITY</u> (1) through (1)(e) remain the same.

- (f) a surface water or ground water source under the direct influence of surface water, as described in Department Circular PWS-5, may not be used as a water source for a non-public system <u>unless a waiver is granted in accordance with ARM 17.36.601. The waiver may be granted by the department only if:</u>
- (i) the system is an existing individual or shared water supply that uses surface water or ground water under the direct influence of surface water; and
 - (ii) adequate treatment is provided through filtration and disinfection.
- (2) Public water supply systems are subject to the requirements of Title 75, chapter 6, MCA, and the rules promulgated thereunder. All public water supplies must be designed by a professional engineer and must comply with the requirements in ARM 17.36.314.

AUTH: 76-4-104, MCA

IMP: 76-4-104, <u>76-4-107</u>, MCA

REASON: The amended rule applies to existing systems that cannot obtain approval of any new well. For example, a cabin site near a lake may have historically used surface water supplies for domestic use and may not be able to drill a new well because of the location. Under the existing rule, such systems cannot use surface water or ground water under the direct influence of surface water, meaning that such systems would have few remaining options for acquiring a water source. The proposed rule is therefore reasonably necessary to provide flexibility in the design of some non-public systems. At the same time, the proposed rule protects public health by (1) limiting the use of surface water to non-public systems, (2) requiring that the water is appropriately treated or filtered, and (3) subjecting a request to use surface water to the waiver process of ARM 17.36.601.

The proposed changes also require that all public water supply systems be designed by a professional engineer. Under 76-4-107(2), MCA, a professional engineer must certify that a public water supply system has been constructed according to approved specifications. However, ARM 17.38.101 of the public water supply rules does not require that a public non-community system be designed by a professional engineer. This creates a gap between the systems that are required to be designed by professional engineers and the systems that are required to be certified by professional engineers. Because many engineers will only certify their own designs or the designs of other engineers, a public system could be designed by someone other than a professional engineer but could not be certified under the statute. The requirement in the proposed changes is therefore reasonably necessary to ensure that systems can be certified in compliance with the statute.

17.36.333 WATER SUPPLY SYSTEMS: DESIGN AND CONSTRUCTION

- (1) The applicant shall meet the following requirements relating to the design and construction of water supply systems:
- (a) <u>proposed</u> individual and shared wells must be constructed in accordance with ARM Title 36, chapter 21, subchapter 6, unless the requirements of this subchapter are more stringent;
- (b) existing individual and shared wells must have been constructed in accordance with the rules in effect at the time of construction;
 - (b) and (c) remain the same but are renumbered (c) and (d).
 - (2) remains the same.

AUTH: 76-4-104, MCA IMP: 76-4-104, MCA

REASON: Some subdivision applications involve existing individual or shared wells that will not be modified by the proposed new facilities in the application. These existing wells might not satisfy current construction requirements if those requirements have changed since the wells were constructed, meaning that they cannot be approved under the existing subdivision rules. The proposed changes

would allow these wells to be approved if they were constructed in accordance with the rules that existed at the time of their construction. The construction rules do not require that wells be re-constructed every time that the rules are changed, so the proposed change will eliminate an unnecessary re-construction caused by the subdivision rules. In doing so, the proposed change will continue to promote consistency between the construction rules and the subdivision rules (since the change only applies to existing wells that were constructed according to the rules in place at the time of their construction), and will continue to protect public health (since applicants already must demonstrate that the quality and quantity of their water source is adequate).

<u>17.36.334 WATER SUPPLY SYSTEMS: OPERATION AND MAINTENANCE, OWNERSHIP, EASEMENTS, AND AGREEMENTS</u> (1) through (4) remain the same.

(5) If an application proposed subdivision includes a shared or multiple-user water supply system that serves more than one lot, or includes a water supply system shared by two or more commercial facilities, the reviewing authority may require the applicant to shall submit to the reviewing authority a draft user agreement that identifies the rights and responsibilities of each user. The user agreement must be signed by all users when the lots are sold. User agreements must be in a form acceptable to the department.

AUTH: 76-4-104, MCA IMP: 76-4-104, MCA

<u>REASON:</u> The proposed changes add multiple-user water supply systems to the types of systems that must submit a user agreement. This change is reasonably necessary to ensure the correct operation and maintenance of multiple-user systems. The proposed changes are also reasonably necessary to clarify that user agreements are not necessary if the system only serves a single lot.

The proposed changes also remove the requirement that the user agreement be signed by all users, since the lots may be undeveloped at the time of the application. Further, the department does not regulate or monitor sales of properties, so the department has no way of enforcing this requirement. However, the certificate of subdivision approval will continue to apply to properties if they are sold, so any conditions of approval based on a user agreement will continue to apply to new property owners.

The proposed changes also substitute "application" for "proposed subdivision." This change is proposed because this rule also applies to applications that do not concern new divisions of land, such as applications for deviations from certificate of subdivision approvals under 76-4-130, MCA, and applications for the removal of sanitary restrictions.

<u>17.36.335 WATER SUPPLY SYSTEMS: EXISTING SYSTEMS</u> (1) and (2) remain the same.

(3) For existing non-public water supply systems within a proposed subdivision, the applicant shall submit information to allow the reviewing authority to

review the quality, quantity, and dependability of the existing system.

- (a) The applicant shall submit, for each existing water supply source, water quality analyses for nitrates (as nitrogen), nitrites and specific conductance. If an existing well is currently being used as a potable water supply within a proposed subdivision, a total coliform analysis must also be conducted. The nitrates, nitrites and specific conductance sample may not be older than one year prior to the date of the application. The coliform sample may not be older than six months prior to the date of application. If an existing well is not currently used as a potable water supply but will be converted to a potable water supply, a total coliform analysis must be conducted when it is put into use. The analysis must be performed by a laboratory certified by the department of public health and human services for analyses of water samples for public water systems. The reviewing authority may not approve the use of an existing system if there is evidence that, after appropriate treatment, the concentration of any ground water constituent exceeds the human health standards in Department Circular DEQ-7, or the maximum contaminant levels established in ARM Title 17, chapter 38, subchapter 2.
 - (b) remains the same.

AUTH: 76-4-104, MCA IMP: 76-4-104, MCA

<u>REASON:</u> High levels of both nitrates and nitrites have been known to cause health risks to individuals. The change is reasonably necessary to protect public health and to provide consistency between the water quality review of existing water supply systems and proposed water supply systems in ARM 17.36.331.

17.36.345 ADOPTION BY REFERENCE (1) through (1)(e) remain the same.

- (f) Department Circular DEQ-8, "Montana Standards for Subdivision Storm Drainage," 2002 2017 edition;
 - (g) through (2) remain the same.

AUTH: 76-4-104, MCA IMP: 76-4-104, MCA

REASON: The department is proposing to adopt a new version of Department Circular DEQ-8, which provides design standards for subdivision storm water drainage facilities. The existing circular was last updated in 2002, and the proposed changes are reasonably necessary to clarify requirements for storm drainage review, correct inconsistencies in the existing circular, standardize certain requirements for better uniformity and predictability, and provide information on new technologies that can be used in the design of storm drainage facilities (e.g., the use of pre-treatment facilities to protect water quality).

The new version of DEQ-8 is being proposed in conjunction with changes to ARM 17.36.310, which currently contains both requirements for the design of storm drainage plans and a requirement that such plans be designed in accordance with DEQ-8. The department is proposing to remove the design requirements from the rule in favor of only the reference to DEQ-8. Together, these changes would

consolidate the design requirements and make them easier to understand and comply with.

The proposed changes in the new circular are as follows:

<u>Foreword</u> The proposed changes add a foreword that explains that the circular is based on demonstrated technology, that certain storm water drainage systems require permits for Class V injection wells, and that the circular replaces previous versions.

<u>Chapter 1: Introduction</u> This chapter includes an applicability statement to explain the role and purpose of storm drainage review in subdivisions and adds a section with definitions of terms used in the document, which is reasonably necessary to make the circular easier to use.

<u>Chapter 2: Submission of Plans</u> This chapter outlines the documents that must be submitted for review of a storm drainage plan, including a report, drawings, construction documents, and an operation and maintenance plan. This information is not new, but has been consolidated into one location for ease of use.

The chapter also describes the process for obtaining deviations from the circular. The section does not create new requirements for obtaining a deviation, but it makes the process more clear by explaining in one place which terms in the circular create mandatory requirements, what constitutes adequate justification for a deviation, and what each deviation request must include to ensure protection of public health, safety, and the environment.

The chapter also specifies that the spreadsheets, design examples, and illustrations included in the circular are for informational purposes and are not regulatory in nature. This is necessary to clarify that the examples are not required designs and do not cover every requirement in the circular.

<u>Chapter 3: Design Criteria</u> This chapter moves the requirements from ARM 17.36.310 for an exempt plan, now renamed a simplified plan, to this document. The use of this plan has been expanded to include subdivisions with five or more lots, so long as the subdivision has less than 25 percent impervious area, has development on slopes less than 3 percent, and does not alter historic runoff patterns outside the subdivision. Under these circumstances, a simplified plan is as protective as a standard plan, so the expanded applicability is appropriate in cases where a standard plan would provide no additional protective measures.

The chapter also establishes the requirement for an initial storm drainage facility to retain, detain, or infiltrate the first 0.5 inches of runoff from a storm event. The first 0.5 inches of rainfall may flush surface pollutants from developments and allow them to enter state ground or surface waters and this requirement is proposed to capture possible pollutants onsite and keep them from entering state waters.

The chapter explains the designation of pre-development conditions in the review of a storm drainage plan. For undeveloped land or developed land for which there has been no previous storm drainage review under the Sanitation in Subdivisions Act, the pre-development condition is land without any improvements. This requirement is reasonably necessary because there may be sites that have

existing improvements that have historically caused storm drainage runoff issues, and this requirement ensures that new divisions of land do not allow historically unlawful practices to continue. For sites that have been approved under the Sanitation in Subdivisions Act, the relevant pre-development site conditions are those conditions that were previously reviewed and approved.

The chapter also provides that precipitation values be determined from one of the following: (1) information provided through the National Oceanic and Atmospheric Administration (NOAA); (2) a tabulated list of cities provided in Appendix A with runoff amounts used by the Montana Department of Transportation; (3) individually developed intensity-duration-frequency (IDF) curves for each site; and (4) other applicable sources. Although all these methods are currently accepted in the existing circular, this updated format provides guidance to users of the document.

Additionally, the chapter outlines when stormwater runoff peak flow rates and stormwater runoff volume calculations are necessary for onsite and offsite basins during different storm events and removes inconsistencies in this requirement from the current circular. It specifies that the methods for calculating these impacts are found in Appendix B.

<u>Chapter 4: Conveyance Structures</u> This chapter outlines the methods used in standard engineering practices to determine the capacity or flow rate of the three most common types of conveyance structures (open channels, pipes, and culverts). Flow volume calculations are required for conveyance structures used in standard plans, and this chapter allows ease of reference for those individuals proposing to use these facilities in their design.

Chapter 5: Retention/Detention Facilities The existing circular refers to "closed-basin ponds" and the interchangeable terms "detention ponds" and "retention ponds." The proposed changes in this chapter clarify this terminology by separating these facilities into "detention ponds" (i.e., ponds with an outlet that temporarily detain storm water) and "retention ponds" (i.e., ponds without an outlet that retain storm water until it evaporates or infiltrates). Because detention ponds are more complicated to construct than retention ponds, the proposed changes allow detention ponds only in standard plans, while retention ponds are allowed in both standard and simplified plans. The changes in this chapter also provide the required standards for each type of pond and outline the methods used in standard engineering practices to determine the capacity or volume of each facility, which is reasonably necessary to ensure that facilities are sized, located, and designed appropriately, and to allow ease of reference for those individuals proposing to use these facilities in their design.

<u>Chapter 6: Infiltration Basins</u> This chapter discusses both infiltrative structures and lawn/landscaping used for stormwater controls. The requirements remove consideration of snowmelt when using lawns/landscaping, which is reasonably necessary because state-wide variations in site characteristics, climate, and melt conditions make it difficult to quantify the impacts from snowmelt. The chapter adds a new procedure for determining infiltration rates for structures,

outlined in Appendix C, and requires the facility to be constructed above groundwater level and to drain within 48 hours. The changes were necessary to ensure the systems are sized appropriately, to protect water quality, and to ensure they address potential for successive storm events, respectively.

<u>Chapter 7: Pre-Treatment</u> Some storm water designs require pre-treatment elements to prevent pollutant-containing storm water from discharging into state waters or to preserve the functionality of the facilities (e.g., keeping trash from clogging the facilities). This new chapter addresses different methods for treatment of stormwater, including vegetated filter strips, vegetated swales, screens, oil/water separators, proprietary spinners/swirl chambers, and drain inlet inserts. These additions are reasonably necessary to provide applicants with information about ways that pre-treatment elements can be incorporated into the storm water facilities.

Appendix A: Precipitation Appendix A has a map with 102 stations across the state with precipitation data. The data is tabulated for the 2-, 10-, and 100-year 24-hour storm events for each station. This is reasonably necessary to provide a basis for calculating precipitation amounts for various requirements throughout the circular.

Appendix B: Acceptable Hydrologic Methods, Models and Time of Concentration Appendix B describes the common engineering models used to determine runoff rate and volume for stormwater. These methods include the Rational Method, the Modified Rational Method, and the TR-55 or SCS Curve Stage-Storage Method, along with a discussion of Time of Concentration and other Computer Models. For the Rational Method, the curve number for undeveloped area was changed from 0.3 to 0.2. The typical range for this curve number is 0.1 to 0.3, and an average curve number of 0.2 is reasonably necessary to allow a better estimate for soil/development conditions across the state.

Appendix C: Infiltration The soil infiltration rate is used to size infiltration facilities. The existing circular requires that infiltration be calculated by a percolation test or "other appropriate testing." The proposed changes require that infiltration be calculated according to a provided infiltration-rate table or by conducting an onsite test (an encased falling head test). These changes are reasonably necessary because the percolation test is better suited for wastewater calculations, not storm water calculations, and "other appropriate testing" provides no guidance to applicants. The encased falling head test is the standard engineering method for calculating infiltration, but the infiltration-rate table provides a simpler way of estimating infiltration when the applicant does not want to conduct the encased falling head test. In addition to being more accurate than the existing circular, these changes standardize the methods accepted by the department, making storm water design and approval more consistent and predictable.

Appendices D through P Appendices D through O provide formulas and examples of spreadsheets, design plans, and drawings. Specifically, Appendix D provides common engineering formulas for determining the rate of discharge for

orifices and weirs from a detention facility, and Appendix E provides common engineering formulas used for determining the peak flow rate for open channel flow (Chezy-Manning Equation) and for curb and gutter facilities. Appendix F provides an example spreadsheet used to calculate a simplified storm drainage plan, and Appendix G provides an example spreadsheet used to calculate a standard storm drainage plan. Appendices H through N provide design examples for different types of storm drainage designs, and Appendix O provides typical drawings for a slotted riser pipe and weir. Appendix P is a works-cited page.

These changes are reasonably necessary to inform applicants of the types of formulas and designs that are acceptable to the department and to assist applicants in the design of storm water facilities.

17.36.802 FEE SCHEDULES (1) through (1)(b)(ii)(A) remain the same.

- (B) new water main distribution system design per lineal foot \$ 0.25
- (C) connection to water main distribution system per lot or unit \$ 70 35.00
- (iii) public water system:
- (A) new system per component per ARM 17.38.106 fee schedule
- (B) new water main distribution system design per lineal foot \$ 0.25
- (C) connection to <u>water main</u> distribution system per lot or structure \$ 70 35.00
 - (c) through (c)(iii)(B) remain the same.
- (iv) gray water reuse systems, holding tanks, sealed pit privies, unsealed pit privies, seepage pits, waste segregation, experimental systems \$ 95.00 (plus \$105.00/hour for review in excess of two hours)
 - (v) multiple-user wastewater system (non-public):
 - (A) new sewer main collection system design per lineal foot \$ 0.25
 - (B) connection to <u>sewer main</u> collection system per lot or unit \$ 70 35.00
- (vi) new public wastewater system per component per ARM 17.38.106 fee schedule
 - (A) new sewer main collection system design per lineal foot \$ 0.25
- (B) connection to $\underline{\text{sewer main}}$ collection system per lot or structure \$ 70 $\underline{35}.00$
 - (d) through (d)(ii) remain the same.
- (iii) reissuance of original approval statement where no review is required per request \$60.00
 - (iv) through (vii) remain the same.
 - (A) plans exempt from simplified Circular DEQ-8 review per lot \$ 40.00
 - (B) plans subject to standard Circular DEQ-8 review:
 - (I) through (viii) remain the same.
- (2) After issuance of two denial letters, the reviewing agency may charge \$105 per hour for the remainder of the review.

AUTH: 76-4-105, MCA IMP: 76-4-105, MCA

<u>REASON:</u> The rule amendments would make changes to the terms used in the rule and the fees applied by the rule.

First, the proposed changes substitute "water main" for "distribution system" and "sewer main" for "collection system." These changes are reasonably necessary to provide consistency with the defined terms in ARM 17.36.101. Fees for connections to water and sewer mains would decrease from \$70.00 to \$35.00, which is reasonably necessary to make the fee commensurate with the actual cost of review. The department estimates that 100 applications per year will be affected by the changes to review fees for connecting to water and sewer mains. The cumulative impact is difficult to estimate because these fees are charged per lot, and each application contains a different number of lots. However, the department roughly estimates that this change will affect 300 lots per year, for an approximate decrease of \$10,500.

Second, the proposed changes clarify that the fee in ARM 17.36.802(1)(d)(iii) applies when the department reissues an approval without review, as provided in the proposed changes to ARM 17.36.314. The department does not know the cumulative impacts or numbers of applications that this will affect.

Third, the rule amendments modify the terms for fees associated with storm drainage plan review, substituting the terms "simplified plan" and "standard plan" for "exempt plan" and "non-exempt plan." These term changes are necessary to be consistent with the terms used in the new version of Department Circular DEQ-8. The words "for review" are proposed to be added to (1)(c)(iv) to clarify the fee and to be consistent with the rest of the rule.

Fourth, the proposed changes apply a \$105 per-hour fee for reviewing an application after the reviewing authority has issued two denial letters. The current rules allow fees to be applied for individual component reviews, but this time spent is difficult to document. The per-hour fee is therefore reasonably necessary to provide a more definable threshold for additional fees in cases where they are warranted. The department estimates that this will affect 25 applications per year, with about 10 hours charged for each application, for an estimated cumulative impact of \$26,250.

<u>17.36.804 DISPOSITION OF FEES</u> (1) remains the same.

- (2) The department shall reimburse local governing bodies under department contract to review subdivisions as follows:
- (a) for subdivisions with individual wastewater treatment systems, the department shall reimburse \$25 35 per lot plus 80 percent of the review fee under ARM 17.36.802 for the following actions performed by the local governing body:
 - (i) through (iii) remain the same.
- (3) The department may reimburse counties that have not been delegated review authority but that perform review services including, but not limited to, inspection of proposed and approved facilities and assistance to persons in the application procedure as follows:
- (a) $$25 \ \underline{35}$ per parcel for subdivisions with individual or shared wastewater treatment systems. A site evaluation must accompany the submittal.
 - (4) remains the same.

AUTH: 76-4-105, MCA IMP: 76-4-105, MCA

<u>REASON:</u> The proposed changes increase the department's reimbursement to local authorities for certain subdivision-related activities. This increased reimbursement is reasonably necessary to allow local health departments to recover actual costs of review, inspection, and enforcement. This reimbursement increase will apply to every county in the state, proportional to the number of reviews that each county does for the department. The department estimates that this increase will amount to approximately \$60,000 per year.

- 4. A copy of proposed Department Circular DEQ-8 (2017) may be viewed at the department's website using the following path: http://deq.mt.gov/Water/PWSUB/sub. Copies may also be obtained by contacting Leata English at (406) 444-4224, or by emailing her at: LEnglish@mt.gov.
- 5. Concerned persons may submit their data, views, or arguments, either orally or in writing, at the hearing. Written data, views, or arguments may also be submitted to Sandy Scherer, Legal Secretary, Department of Environmental Quality, 1520 E. Sixth Avenue, P.O. Box 200901, Helena, Montana 59620-0901; faxed to (406) 444-4386; or e-mailed to sscherer@mt.gov, no later than 5:00 p.m., October 20, 2017. To be guaranteed consideration, mailed comments must be postmarked on or before that date.
- 6. The department maintains a list of interested persons who wish to receive notices of rulemaking actions proposed by this agency. Persons who wish to have their name added to the list shall make a written request that includes the name, email, and mailing address of the person to receive notices and specifies that the person wishes to receive notices regarding: air quality; hazardous waste/waste oil; asbestos control; water/wastewater treatment plant operator certification; solid waste; junk vehicles; infectious waste; public water supply; public sewage systems regulation; hard rock (metal) mine reclamation; major facility siting; opencut mine reclamation; strip mine reclamation; subdivisions; renewable energy grants/loans; wastewater treatment or safe drinking water revolving grants and loans; water quality; CECRA; underground/above ground storage tanks; MEPA; or general procedural rules other than MEPA. Notices will be sent by e-mail unless a mailing preference is noted in the request. Such written request may be mailed or delivered to Sandy Scherer, Legal Secretary, Department of Environmental Quality, 1520 E. Sixth Ave., P.O. Box 200901, Helena, Montana 59620-0901, faxed to the office at (406) 444-4386, e-mailed to Sandy Scherer at sscherer@mt.gov, or may be made by completing a request form at any rules hearing held by the department.
- 7. Aaron Pettis, attorney for the department, has been designated to preside over and conduct the hearing.
- 8. The bill sponsor contact requirements of 2-4-302, MCA, apply. The department notified the primary sponsors of Chapters 261 and 344, Laws of 2017, by sending them letters on September 1, 2017.

9. With regard to the requirements of 2-4-111, MCA, the department has determined that the amendment of the above-referenced rules will significantly and directly impact small businesses.

Reviewed by: DEPARTMENT OF ENVIRONMENTAL QUALITY

/s/ John F. North BY: /s/ Tom Livers

JOHN F. NORTH TOM LIVERS,
Rule Reviewer Director

Certified to the Secretary of State, September 11, 2017.